

App. of Ulrich et al.
Ser. No. 08/882,431

Please add the following new claims 111-113.

--111. (New) The DNA construct designated pETB2360210.

112. (New) An isolated and purified superantigen toxin DNA fragment encoding Staphylococcal enterotoxin B (SEB) in which at least one amino acid of amino acid positions 40-50 of SEB and at least one amino acid selected from the group consisting of amino acid positions 18-28, 55-65, 62-72, 84-94, 86-96, 89-99, 110-120 and 205-215 of SEB have been altered such that binding of said encoded SEB to the MHC class II receptor and T cell antigen receptor is altered.

113. (New) The DNA fragment of claim 112, which encodes SEB in which the amino acids in positions 40-50, 84-89 and 89-99 have been altered. --

REMARKS

Reconsideration and allowance of the subject application are respectfully requested.

With the entry of this amendment, claims 1, 4-6, 12-14, 18, 21-23, 29-31, 37-39, 43, 44, 47-49, 53, 56-58, 62, 65-67 and 111-113 are pending. By the above amendments, we have amended claim 1 to state that the alterations of SEB includes at least one amino acid selected from the group consisting of amino acid positions 40-50, 62-67, 84-89 and 110-120 of SEB, and at least one amino acid of amino acid positions 18-28, 55-65, 86-96, 89-99, and 205-215 of SEB. Support for this amendment can be found on page 19, line 22 through page 21, line 17 of the specification, which states that

The residues which can be altered can be within 5 amino acid residues of the central leucine of the hydrophobic loop (such as L45 of SEB), or within 5 residues of the amino acid residues of the polar binding pocket that can contact HLA-DR, (such as E67, Y89, or Y115 of SEB). . . . In addition, side chains of certain nonconserved receptor-binding surfaces, can also be altered when